

Operating Instructions and Parts Manual 18-Inch, 20-Inch Band Saw

Models: JWBS-18QT, -18QT-3, -20QT-3, -20QT-5







JWBS-20QT

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Warranty and Service

JET warrants every product it sells against manufacturers' defects. If one of our tools needs service or repair, please contact Technical Service by calling 1-800-274-6846, 8AM to 5PM CST, Monday through Friday.

Warranty Period

The general warranty lasts for the time period specified in the literature included with your product or on the official JET branded website.

- JET products carry a limited warranty which varies in duration based upon the product. (See chart below)
- Accessories carry a limited warranty of one year from the date of receipt.
- Consumable items are defined as expendable parts or accessories expected to become inoperable within a reasonable amount of use and are covered by a 90 day limited warranty against manufacturer's defects.

Who is Covered

This warranty covers only the initial purchaser of the product from the date of delivery.

What is Covered

This warranty covers any defects in workmanship or materials subject to the limitations stated below. This warranty does not cover failures due directly or indirectly to misuse, abuse, negligence or accidents, normal wear-and-tear, improper repair, alterations or lack of maintenance.

Warranty Limitations

Woodworking products with a Five Year Warranty that are used for commercial or industrial purposes default to a Two Year Warranty. Please contact Technical Service at 1-800-274-6846 for further clarification.

How to Get Technical Support

Please contact Technical Service by calling 1-800-274-6846. Please note that you will be asked to provide proof of initial purchase when calling. If a product requires further inspection, the Technical Service representative will explain and assist with any additional action needed. JET has Authorized Service Centers located throughout the United States. For the name of an Authorized Service Center in your area call 1-800-274-6846 or use the Service Center Locator on the JET website.

More Information

JET is constantly adding new products. For complete, up-to-date product information, check with your local distributor or visit the JET website.

How State Law Applies

This warranty gives you specific legal rights, subject to applicable state law.

Limitations on This Warranty

JET LIMITS ALL IMPLIED WARRANTIES TO THE PERIOD OF THE LIMITED WARRANTY FOR EACH PRODUCT. EXCEPT AS STATED HEREIN, ANY IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE ARE EXCLUDED. SOME STATES DO NOT ALLOW LIMITATIONS ON HOW LONG AN IMPLIED WARRANTY LASTS, SO THE ABOVE LIMITATION MAY NOT APPLY TO YOU.

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Product Listing with Warranty Period

90 Days - Parts; Consumable items; Light-Duty Air Tools

1 Year - Motors; Machine Accessories; Heavy-Duty Air Tools; Pro-Duty Air Tools

2 Year – Metalworking Machinery; Electric Hoists, Electric Hoist Accessories; Woodworking Machinery used for industrial or commercial purposes

5 Year – Woodworking Machinery

Limited Lifetime – JET Parallel clamps; VOLT Series Electric Hoists; Manual Hoists; Manual Hoist Accessories; Shop Tools; Warehouse & Dock products; Hand Tools

NOTE: JET is a division of JPW Industries, Inc. References in this document to JET also apply to JPW Industries, Inc., or any of its successors in interest to the JET brand.

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- 1. Read and understand the entire owner's manual before attempting assembly or operation.
- 2. Read and understand the warnings posted on the machine and in this manual. Failure to comply with all of these warnings may cause serious injury.
- 3. Replace the warning labels if they become obscured or removed.
- 4. This band saw is designed and intended for use by properly trained and experienced personnel only. If you are not familiar with the proper and safe operation of a band saw, do not use until proper training and knowledge have been obtained.
- 5. Do not use this band saw for other than its intended use. If used for other purposes, JET disclaims any real or implied warranty and holds itself harmless from any injury that may result from that use.
- 6. Always wear approved safety glasses/face shields while using this band saw. Everyday eyeglasses only have impact resistant lenses; they are not safety glasses.
- 7. Before operating this band saw, remove tie, rings, watches and other jewelry, and roll sleeves up past the elbows. Remove all loose clothing and confine long hair. Non-slip footwear or anti-skid floor strips are recommended. Do not wear gloves.
- 8. Wear ear protectors (plugs or muffs) during extended periods of operation.
- 9. Some dust created by power sanding, sawing, grinding, drilling and other construction activities contain chemicals known to cause cancer, birth defects or other reproductive harm. Some examples of these chemicals are:
- Lead from lead based paint.
- Crystalline silica from bricks, cement and other masonry products.
- Arsenic and chromium from chemically treated lumber.
 - Your risk of exposure varies, depending on how often you do this type of work. To reduce your exposure to these chemicals, work in a well-ventilated area and work with approved safety equipment, such as face or dust masks that are specifically designed to filter out microscopic particles.
- 10. Do not operate this machine while tired or under the influence of drugs, alcohol or any medication.
- 11. Make certain the switch is in the OFF position before connecting the machine to the power supply.
- 12. Make certain the machine is properly grounded.
- 13. Make all machine adjustments or maintenance with the machine unplugged from the power source.
- 14. Remove adjusting keys and wrenches. Form a habit of checking to see that keys and adjusting wrenches are removed from the machine before turning it on.
- 15. Keep safety guards in place at all times when the machine is in use. If removed for maintenance purposes, use extreme caution and replace the guards immediately.
- 16. Check damaged parts. Before further use of the machine, a guard or other part that is damaged should be carefully checked to determine that it will operate properly and perform its intended function. Check for alignment of moving parts, binding of moving parts, breakage of parts, mounting and any other conditions that may affect its operation. A guard or other part that is damaged should be properly repaired or replaced.
- 17. Provide for adequate space surrounding work area and non-glare, overhead lighting.
- 18. Keep the floor around the machine clean and free of scrap material, oil and grease.
- 19. Keep visitors a safe distance from the work area. Keep children away.



- 20. Make your workshop child proof with padlocks, master switches or by removing starter keys.
- 21. Give your work undivided attention. Looking around, carrying on a conversation and "horse-play" are careless acts that can result in serious injury.
- 22. Maintain a balanced stance at all times so that you do not fall or lean against the blade or other moving parts. Do not overreach or use excessive force to perform any machine operation.
- 23. Use the right tool at the correct speed and feed rate. Do not force a tool or attachment to do a job for which it was not designed. The right tool will do the job better and safer.
- 24. Use recommended accessories; improper accessories may be hazardous.
- 25. Maintain tools with care. Keep blades sharp and clean for the best and safest performance. Follow instructions for lubricating and changing accessories.
- 26. Turn off the machine before cleaning. Use a brush or compressed air to remove chips or debris do not use your hands.
- 27. Do not stand on the machine. Serious injury could occur if the machine tips over.
- 28. Never leave the machine running unattended. Turn the power off and do not leave the machine until it comes to a complete stop.
- 29. Remove loose items and unnecessary work pieces from the area before starting the machine.

Familiarize yourself with the following safety notices used in this manual:

This means that if precautions are not heeded, it may result in minor injury and/or possible machine damage.

AWARNING This means that if precautions are not heeded, it may result in serious injury or possibly even death.

-- SAVE THESE INSTRUCTIONS --

Introduction

This manual is provided by JET covering the safe operation and maintenance procedures for JET model JWBS-18QT and JWBS-20QT series band saws. This manual contains instructions on installation, safety precautions, general operating procedures, maintenance instructions and parts breakdown. This machine has been designed and constructed to provide years of trouble free operation if used in accordance with instructions set forth in this manual. If there are any questions or comments, please contact either your local supplier or JET. JET can also be reached at our web site: www.jettools.com.

Specifications

Model Number	JWBS-18QT	JWBS-18QT-3	JWBS-20QT-3	JWBS-20QT-5
Stock Number				
Band Saw Nominal Size (in.)	18	18	20	20
Capacities and Speeds:				
Cutting Capacity (height) (in.)				
Cutting Capacity (width) (in.)				
Maximum Rip Left of Blade w/Fence				
Maximum Rip Right of Blade w/Fen				
Blade Length (in.)				
Blade Speed (FPM)				
Blade providedho				
Minimum Blade Width (in.)				
Maximum Blade Width (in.)				
Wheel Diameter (in.)	18-5/8	18-5/8	20-1/2	20-1/2
Table and Fence:				
Table Size (in.)				
Table Tilt (degrees)				
Table Height from Floor (in.)				
Fence Size (LxWxH/in.)23-				
Resaw post (LxDia./in.)	6 x 1-1/8	6 x 1-1/8	6 x 1-1/8	6 x 1-1/8
<u>Dust Collection:</u>	_			
Dust Port Outside Diameter (in.)				
Minimum Extraction Volume Requir	ed (CFM)400	400	400	400
			_, ,,,,,,	
Overall Dimensions (HxWxD/in.) 7	3 x 41-1/2 x 30	/3 x 41-1/2 x 32	/4 x 41-1/2 x 3/	74 x 41-1/2 x 39
Market and Electrical				
Motor and Electricals:	ID(4 0L)M) 4DLI	OLID/O OLIM/\ ADLI	0110/0 0144/) 4011	5UD/0.7UM/ 4DU
Motor1.75H	P(1.3KW), 1PH	3HP(2.2KVV), 1PH	3HP(2.2KVV), 1PH	5HP(3.7KVV), 1PH
115/230V ¹ , Start Capacitor30	17.6/8.8A, 60HZ	230V, 13A, 60HZ	230V, 13A, 60Hz	230V, 21A, 60HZ
Start Capacitor30	0MFD 125VAC	300IVIFD 125VAC	300MFD 125VAC	300MFD 250VAC
Run Capacitor	. 40μF 250VAC	60µF 250VAC	60µF 250VAC	50µF 450VAC
Power transfer				
Power plug includedRecommended circuit size ²	yes	no	no	no
Recommended circuit size	40A/20A	30A	30A	50A
Weighter				
Weights: Net Weight (lbs.)	275	204	EGO	EOE
Shipping Weight (lbs.)	315	381		
Shipping weight (ibs.)	4ე∠	409	043	0/0

¹ Prewired 115V

The above specifications were current at the time this manual was published, but because of our policy of continuous improvement, JET reserves the right to change specifications at any time and without prior notice, without incurring obligations.

² Subject to local and national electrical codes.

Grounding Instructions

AWARNING This machine must be grounded while in use to protect the operator from electric shock.

In the event of a malfunction or breakdown, grounding provides a path of least resistance for electric current to reduce the risk of electric shock. This machine is equipped with an electric cord having an equipment-grounding conductor and a grounding plug. The plug must be plugged into a matching outlet that is properly installed and grounded in accordance with all local codes and ordinances.

Do not modify the plug provided. If it will not fit the outlet, have the proper outlet installed by a qualified electrician.

Improper connection of the equipment-grounding conductor can result in a risk of electric shock. The conductor, with insulation having an outer surface that is green with or without yellow stripes, is the equipment-grounding conductor. If repair or replacement of the electric cord or plug is necessary, do not connect the equipment-grounding conductor to a live terminal.

Check with a qualified electrician or service personnel if the grounding instructions are not completely understood, or if in doubt as to whether the tool is properly grounded. Use only three wire extension cords that have three-prong grounding plugs and three-pole receptacles that accept the tool's plug.

Repair or replace a damaged or worn cord immediately.

Model JWBS-18QT

Model JWBS-18QT Band Saw has a 1-3/4 HP 1 phase motor and is wired from the factory for 115 volt operation, but can be rewired for 220 volts.

115 Volt Operation

The JWBS-18QT Band Saw comes equipped with a *plug* that looks like A, Fig. 1. and is used in an *outlet* that looks like B, Fig. 1. A *temporary adapter* with a *grounding ear* secured with a *screw* (C, Fig. 1) may be used to connect this plug to a two-pole receptacle if a properly grounded outlet is not available. The temporary adapter should only be used until a properly grounded outlet can be installed by a qualified electrician. **This adapter is not applicable in Canada.** The green colored *grounding ear*, lug, or tab, extending from the adapter, must be connected to a permanent ground such as a

properly grounded outlet box, as shown in C, Fig. 1.

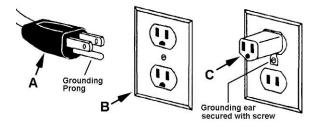


Figure 1

230 Volt Operation

To convert the JWBS-18QT from 115V to 230V, single phase operation, the following is strongly recommended:

Contact your local Authorized JET Service Center or qualified electrician for proper procedures to install the plug. The band saw must comply with all local and national codes after the 230V plug is installed.

Change the lead wires at the motor junction box as shown in B, Figure 2.

The 115V attachment plug supplied with the band saw (C, Fig. 2) must be replaced with a UL/CSA listed plug suitable for 230V operation (D, Fig. 2).

The band saw with a 230V plug should only be connected to an outlet having the same configuration (D, Fig. 2). No adapter is available or should be used with the 230V plug.

Important: In all cases (115 or 230 volts), make certain the receptacle in question is properly grounded. If you are not sure, have a registered electrician check the receptacle.

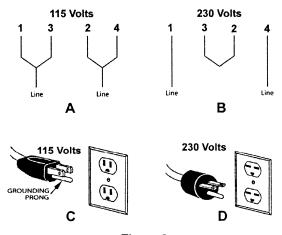


Figure 2

Models JWBS-18-3, -20QT-3, -20QT-5

Band saw models JWBS-18QT-3, JWBS-20QT-3 and JWBS-20QT-5 are wired from the factory for 230 volt operation only. Refer to *Specifications* for phase and HP ratings.

A plug is not included. You may either install a plug or "hard-wire" the band saw directly to a control panel.

If connecting a plug, use a proper UL/CSA listed 2-pole, 3-wire grounding plug suitable for 230V operation.

If the band saw is to be hard-wired to a panel, make sure a disconnect is available for the operator. During hard-wiring of the band saw, make sure the fuses have been removed or the breakers have been tripped in the circuit to which the band saw will be connected. Place a warning placard on the fuse holder or circuit breaker to prevent it being turned on while the machine is being wired.

Circuit Information

The Band Saw should be connected to a dedicated circuit with a circuit breaker or time delay fuse with the appropriate amperage rating. See Table 1 for recommended circuit sizes. NOTE: These are recommendations only – all local codes must be given priority.

Extension cords

The use of an extension cord is not recommended for this band saw. Try to position your machine within reach of the power supply. If an extension cord becomes necessary, make sure the cord rating is suitable for the amperage listed on the machine's motor plate. An undersized cord will cause a drop in line voltage resulting in loss of power and overheating.

Use the chart in Table 2 as a general guide in choosing the correct size cord. If in doubt, use the next heavier gauge. The smaller the gauge number, the heavier the cord.

Model	Voltage	Recommended Circuit*
JWBS-18QT 710750B	115V	40A
	230V	20A
JWBS-18QT-3 710751B	230	30A
JWBS-20QT-3 708754B	230	30A
JWBS-20QT-5 708755B	230	50A

^{*} Local codes take precedence over recommendations.

Table 1

Recommended Gauges (AWG) of Extension Cords

		Extension Cord Length *				
Amps	25 feet	50 feet	75 feet	100 feet	150 feet	200 feet
< 5	16	16	16	14	12	12
5 to 8	16	16	14	12	10	NR
8 to 12	14	14	12	10	NR	NR
12 to 15	12	12	10	10	NR	NR
15 to 20	10	10	10	NR	NR	NR
21 to 30	10	NR	NR	NR	NR	NR

^{*}based on limiting the line voltage drop to 5V at 150% of the rated amperes.

NR: Not Recommended.

Table 2

Unpacking

Remove the crate and packing material from the band saw except for the transport skid on the bottom. Inspect the machine for damage. Report any damage to your distributor and shipping agent.

Move the saw to its permanent working location. The site should be dry, well lit, and have enough room to handle long stock and the service and/or adjustment of the machine from any side.

Move the band saw off the skid. Clean all rust protected surfaces with a mild solvent or diesel fuel and a soft cloth. Do not use lacquer thinner, paint thinner, or gasoline. These will damage painted surfaces.

Contents of Shipping Container

- 1 Band Saw (not shown)
- 1 Rail Guide (A)
- 1 Rear Rail (B)
- 1 Front Rail (C)
- 1 Fence Body (D)
- 1 Miter Gauge (E)
- 1 Fence (F)
- 1 Table (G)
- 1 Accessory Package Contains:

Hardware Bag

- 1 Resaw Post (H)
- 1 10/12mm Open End Wrench (J)
- 1 Handle (K)
- 1 Lock Handle (L) JWBS-20QT only
- 1 Resaw Post Lock Knob (M)
- 1 Lock Knob (N) JWBS-20QT only
- 2 Lock Knob (N) JWBS-18QT only

Fence Hardware Bag

- 4 5/16-18x3/4 Socket Head Cap Screws (P)
- 4 5/16 Flat Washers (Q)
- 4 5/16 Lock Washers (R)

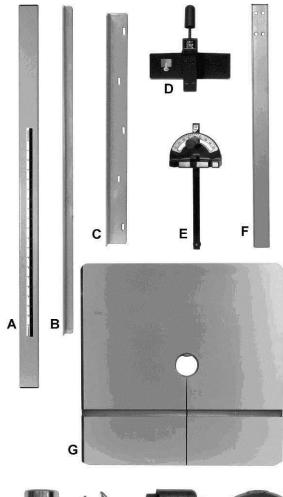
Rail Hardware Bag

- 9 1/4-20x5/8 Hex Cap Screws (S)
- 9 1/4 Flat Washers (T)
- 9 1/4 Lock Washers (U)
- 1 Owner's Manual (not shown)
- 1 Warranty Card (not shown)

Tools Required for Assembly & Adjustments

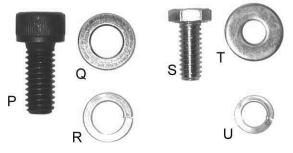
The tools listed below are not included but are required for assembly.

- 2 14mm Open End Wrench
- 1 Cross Point Screw Driver
- 1 Combination Square





Above items not to scale



Items P - U are actual size

Figure 3 - Hardware

Assembly

Handwheel

Attach the handle (A, Fig. 4) to the handwheel (B, Fig. 4).



Figure 4

Mounting the Table

Important: The table is heavy. Mounting with the help of another person is recommended.

Referring to Figures 5 and 6:

- 1. Remove the table *insert* (A) and *tapered* pin (B).
- 2. Slide the table so the *saw blade* (D) passes through the *slot* where the *tapered pin* (B) was located.
- 3. Rotate the table 90 degrees so that the miter slot (C) is parallel to the blade (D) and to the right of the blade when facing the band saw as viewed in Figure 6.
- 4. Line up the *table* (G) to the trunnions so that the *bolts* (F_1 , F_2) feed through the *support* bracket (E_1 , E_2).

For band saw model JWBS-18QT

Secure the table with two lock knobs (H).

For band saw model JWBS-20QT

Secure the table with lock knob (H) to bolt F_1 and lock handle (J) to bolt F_2 .

5. Reinstall the table *insert* (A) and *tapered* pin (B).

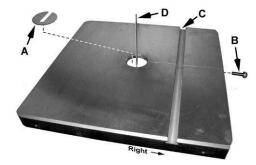
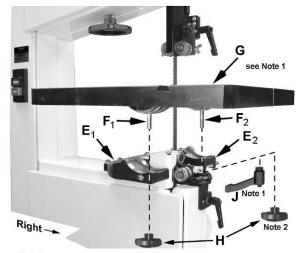


Figure 5



Note 1 - JWBS-20QT uses lock handle (J) Note 2 - JWBS-18QT uses lock knob (H)

Figure 6

Rail Assembly

Referring to Figure 7:

- 1. Attach the *front rail* (F) to the cast iron table with two 1/4" x 5/8" *hex cap screws*, two 1/4" *lock washers*, and two 1/4" *flat washers*. The screws should be in approximately the center of the slot. Hand-tighten only at this time.
- 2. Attach the *rear rail* (G) to the table with two 1/4" x 5/8" hex cap screws, two 1/4" lock washers, and two 1/4" flat washers. Screws should be in approximately the center of the slot. Hand-tighten only at this time.
- 3. Push the front and rear rails *up* as far as they will go.
- 4. Using a 10mm wrench, tighten the four hex cap screws holding the front and rear rails to the table. Do not over-tighten the screws.
- 5. Attach the *guide tube* (H) to the front rail with five 1/4" x 5/8" hex cap screws, five 1/4" lock washers, and five 1/4" flat washers. Screws should be in approximately the center of the slot

Hand-tighten the guide tube only at this time. You will be instructed to secure it later in the Fence Assembly and Adjustment section.

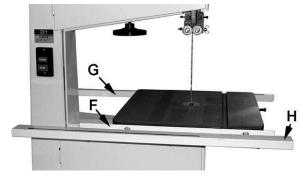


Figure 7

Fence Assembly and Adjustment

Assembling the Fence to Fence Body

Referring to Figure 8:

1. Attach the fence (A) to the fence body (B) with four 5/16" x 3/4" socket head cap screws (C), four 5/16" lock washers (D), and four 5/16" flat washers (E). Hand-tighten only at this time.

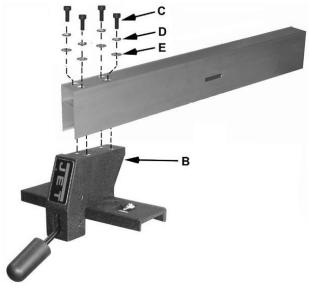


Figure 8

Fence Adjustment

 Place the fence assembly onto the guide rail (D, Fig. 9) and against the edge of the miter slot (C, Fig. 9). The hook at the rear of the fence should fit under the rear rail (see Figure 12).

The fence must align parallel to the miter slot along the entire length of the fence.

If adjustment is necessary:

- 3. Lock the fence by pushing down the *lock handle* (A, Fig. 9). Because the screws are only hand-tight, you can shift the fence slightly as needed until the fence is parallel the miter slot.
- 4. When the fence has been properly aligned to the miter slot, tighten the four socket head cap screws (B, Fig. 9) with a 6mm hex wrench. Make sure the fence remains parallel to the miter slot as you tighten the screws.

Note: This alignment will again be checked once the guide rail has been tightened.

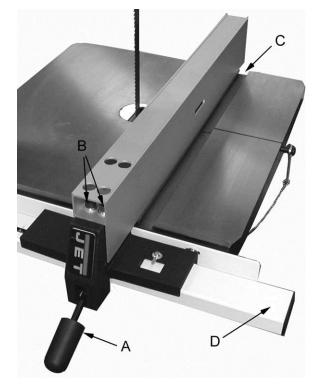
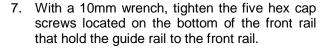


Figure 9

- Move the fence assembly to the other side of the blade as shown in Figure 10 so that the pointer (B, Fig. 10) on the fence body points to zero on the scale. Lock the fence by pushing the handle (A, Fig. 10) down.
- 6. Move the guide rail (D, Fig. 10) with the locked fence until the fence is flush against the blade (C, Fig. 10). Do not unlock the fence to perform this. Move the fence and guide rail together when establishing the zero point.

Important: Do not force the fence into the blade so that the blade bends.



Note: After tightening the guide rail, double check that the fence is still parallel to the miter slot. Make additional adjustments if needed.

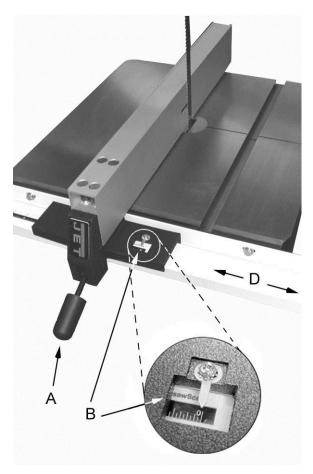


Figure 10

Adjusting Clearance between Fence and Table

Referring to Figures 11 and 12:

Check the clearance between the table and the fence. The fence should not rub against the table surface but be slightly above it. This gap should be the same at the front of the table as it is at the rear.

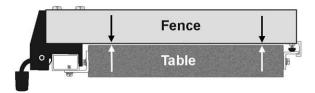


Figure 11

If the gap between fence and table is not consistent, loosen either of the *hex nuts* on the *hook* (Figure 12) and rotate the *sliding pad* until the fence/table gap is consistent across the full length of the table. When this is achieved, tighten both hex nuts.

Check the adjustment of the *hook* at the rear of the fence. The hook should be positioned so that it overlaps the rear rail by approximately 1/8" (Fig. 12). To adjust the hook, loosen the *upper hex nut* and slide the hook in or out as needed. Retighten upper hex nut.

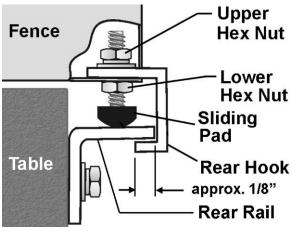


Figure 12

Resaw Guide

For resawing attach the *post* (A, Fig. 13) to the fence with the *lock knob* (B, Fig. 13). There is a slotted hole in the fence that will accommodate the resaw kit. Position the post so that it is centered with the front edge of the blade. The resaw guide will give you a taller, single point contact surface during resawing.

Miter Gauge

- 1. Place the miter gauge in the table slot.
- 2. With a square verify the miter gauge face is square to the blade.
- 3. If the miter gauge is not square to the blade loosen the lock knob (C, Fig. 13) and adjust to the proper setting. Tighten the lock knob.
- 4. If the pointer is not at 90 degrees, loosen the screw (D, Fig. 13) holding the pointer and move the pointer to 90 degrees.
- 5. Re-tighten the screw.

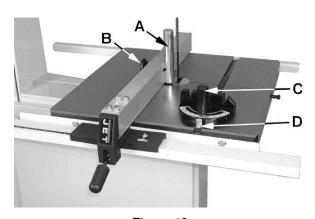


Figure 13

Adjustments

Table Tilt

Referring to Figure 14:

- 1. Disconnect machine from power source.
- 2. Loosen the lock knob(s)/lock handle (G).
- 3. Tilt table up to 45 degrees to the right, or up to 10 degrees to the left.
- 4. Tighten the lock knob(s)/lock handle.

Note: Table *stop bolt* (F, Fig. 14) must be removed to tilt table to the left.

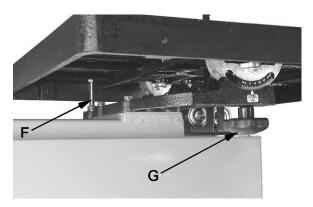


Figure 14

Adjusting 90 Degree Table Stop

Before adjusting the 90° table stop, the blade tension must be properly adjusted (described in the *Blade Tension* section).

To adjust the 90° table stop:

- Loosen lock knob(s)/lock handle (C, Fig. 15) and tilt the table until it rests against table stop bolt (B, Fig. 15); then re-tighten the lock knob(s)/handle.
- 2. Use a *square* (E, Fig. 16) placed on the table and against the blade to see if the table is 90 degrees to the blade.
- If an adjustment is necessary, loosen the lock knob(s)/handle (C, Fig. 15). Tilt the table until it is square to the blade; then re-tighten the lock knobs.
- 4. Loosen *lock nut* (A, Fig. 15) and turn table *stop bolt* (B, Fig. 15) until it contacts the table. Tighten the *nut* (A, Fig. 15) to hold table stop in place. When tightening the nut hold the table stop bolt in place with a wrench to prevent movement.
- 5. If necessary, adjust the *pointer* (D, Fig. 15) to zero.

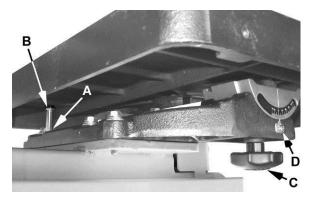


Figure 15

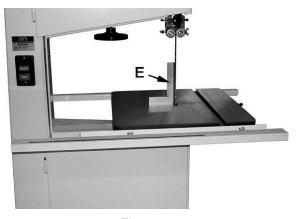


Figure 16

Installing/Changing Blades

AWARNING Disconnect machine from power source. Blade teeth are sharp, use care when handling the blade. Failure to comply may cause serious injury.

- 1. Disconnect machine from power source.
- 2. Place the mode selection lever (J, Fig. 18) in the Full Release (Blade Change) position.

Note 1: When changing the position of the *mode selection lever*, the machine must be turned off.

Note 2: The *blade tension handwheel* (A, Fig. 17) is primarily used for initial blade tension adjustments (described on following page).

- 3. Remove the table insert (B, Fig. 17).
- 4. Remove the *tapered pin* (C, Fig. 17) by using the wrench attached together with the pin.
- 5. Lower the *upper blade guide assembly* (F, fig. 17) by loosening the *knob* (H, Fig. 18) and rotating the *handwheel* (G, Fig. 18) clockwise.
- 6. Open upper and lower front doors (D, Fig. 17).
- 7. Carefully remove the blade from between upper and lower blade guides and upper and lower wheels; then remove blade through the *table slot* (E, Fig. 17).
- 8. Guide new blade through *table slot* (E, Fig. 17). Place blade in upper and lower blade guides.

Note: Make sure blade teeth point down toward table (see inset, Fig. 17), and toward the front of the saw.

Hint: If the teeth cannot be made to point down, try turning the blade inside out first, then reattempt.

- Position blade on the middle of the upper and lower wheels.
- 10. Replace the *table insert* (B, Fig. 17) and *tapered pin* (C, Fig. 17).
- 11. Place the lever (J, Fig. 18) to the *Full Tension* or *Partial Tension* (*Idle/Tracking*) position.

Before operating the band saw, the new blade must be adjusted and blade guides re-adjusted. The required adjustments are contained in the sections listed below and which follow immediately:

- ☐ Blade Tension (page 16)
- Blade Tracking (page 16)
- ☐ Upper Bearing Adjustment (page 17)
- □ Lower Bearing Adjustment (page 18)

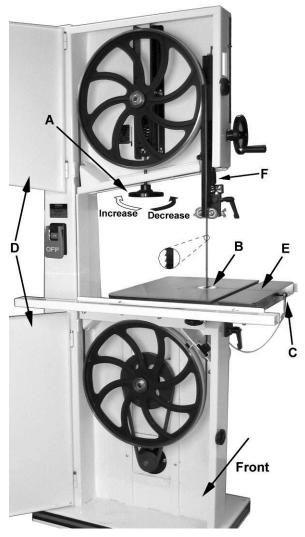


Figure 17

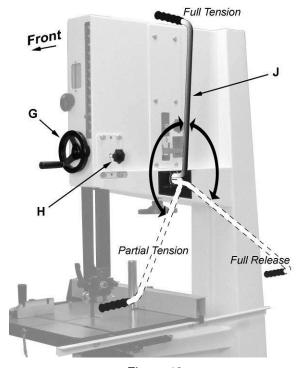


Figure 18

Blade Tension

Blade tension is set with the blade tension handwheel (A, Fig. 19) and is performed following blade replacement and periodically as the blade stretches from use.

AWARNING Disconnect machine power source before making any adjustments.

Referring to Figure 19:

- 1. Place the mode selection lever (F) in the Full Tension position (see Figure 18).
- 2. Set the blade tension by rotating the handwheel (A) according to the arrow directions shown in Figure 19.

The gauge (B) indicates the approximate tension according to the width of the blade in inches. Initially, set the blade tension to correspond to the width of your blade.

The JWBS-18QT comes with a 3/4" blade so the tension should be set at 3/4" when using this blade.

The JWBS-20QT comes with a 1" blade so the tension should be set at 1" when using this blade.

Note: For the JWBS-18QT the tension gauge can also be seen from the front of the saw through the wheel when the upper door is open.

As you become familiar with the saw, you may find it necessary to change the blade tension from the initial setting.

Keep in mind that too little or too much blade tension can cause blade breakage and/or poor cutting performance.

Tip: When the band saw is not being used, place the mode selection lever (J, Fig. 18) to the Partial *Tension* position – this will prolong the blade's life.

Blade Tracking

Tracking refers to the position of the saw blade on the wheels while the machine is in operation. Tracking has been factory-adjusted. However, it should be checked occasionally, including after every blade change.

AWARNING Disconnect machine from power source before making any adjustments.

Important: The blade must be in Full or Partial Tension positions before adjusting blade tracking (see previous section). Make sure the blade guides and other parts of the machine will not interfere with the movement of the blade.

To inspect and adjust tracking, proceed as follows:

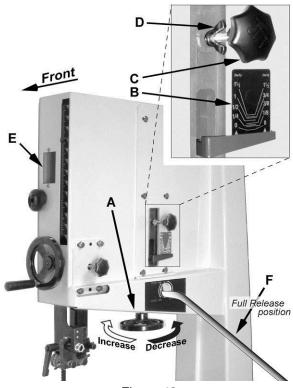
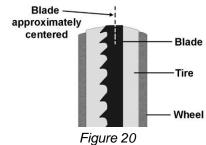


Figure 19

- Open upper front door to expose the wheel. Rotate the wheel clockwise by hand and observe the position of the blade on the wheel through the window (E, Fig. 19). The blade should ride upon the center of the wheel as shown in Figure 20.
- If the blade tends to move toward the edge of the wheel, loosen the wing nut (D, Fig. 19) and slightly rotate the knob (C, Fig. 19). Rotating the knob clockwise will cause the blade to move toward the rear edge of the wheel. Rotating the knob counterclockwise will cause the blade to move toward the front edge of the wheel.

Note: This adjustment is sensitive; perform it in small increments and give the blade time to react to the changes as you continue to rotate the wheel.

- When the blade is tracking properly in the center of the wheel, re-tighten the wing nut (D, Fig. 19).
- Close the upper front door.



Overview - Bearing Adjustments

Thrust (back support) bearing are located behind the saw blade and provide support to the back of the blade when the saw is in operation.

Guide bearings are located on either side of the saw blade and provide stability for the blade when the saw is in operation. These bearings rotate on an eccentric shaft so the distance from the blade can be adjusted for optimal performance.

Upper Bearing Adjustments

AWARNING Unplug the machine from power source before making any adjustments! Blade teeth are sharp - use care when working near the saw blade. Failure to comply may cause serious injury.

Note: Blade tension and tracking must be properly adjusted prior to bearing guide setup. Refer to the *Blade Tension* section (previous page).

To adjust the thrust bearing:

1. Place the *mode selection lever* (J, Fig. 18) in the *Full Tension* position.

Referring to Figure 21:

 Loosen the wing nut (E) and slide the bearing and bearing post until the space between the thrust bearing (H) and the back edge of the blade (G) is approximately 1/64".

A convenient way to achieve this spacing is by placing a dollar bill folded twice (four thicknesses) between the blade and support bearing – four thicknesses of a dollar bill is approximately 1/64".

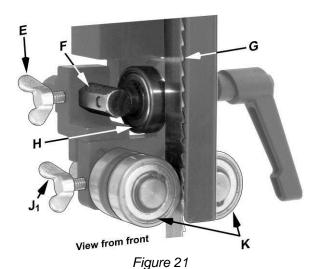
3. Tighten wing nut (E).

To adjust the guide bearings (refer to Figure 22):

- Loosen the locking handle (L) and slide the assembly until the front of the guide bearings rest just behind the gullet of the blade teeth (see inset).
- Loosen two wing nuts (J₁, J₂). Rotate the adjustment handles (M) until the guide bearings (K) rest lightly against the blade (N). Do not force the guide bearings against the side of the blade.
- 6. Tighten wing nuts (J₁, J₂ Fig. 22).

Check to make sure the adjustments have not changed and the bearing guides do not pinch the blade.

Place the *mode selection lever* (J, Fig. 18) in the *Partial Tension* position when the machine is not in use.



Guilde Bearing

J

View from back

Figure 22

Lower Bearing Adjustments

AWARNING Unplug the machine from power source before making any adjustments! Blade teeth are sharp - use care when working near the saw blade. Failure to comply may cause serious injury.

Note: Blade tension and tracking must be properly adjusted prior to bearing guide setup. Refer to the *Blade Tension* section (page 16).

1. Place the *mode selection lever* (J, Fig. 18) in the *Full Tension* position.

Referring to Figure 23:

2. Loosen the thumb screw (B).

This will allow the *thrust bearing* (A) to move freely and prevent interference with the *saw blade* (C) during the following steps.

Guide Gearings Adjustment

- Loosen the locking handle (D) then turn the adjustment screw (E) to adjust the assembly forward or backward until the front of the guide bearings (F) rest just behind the gullet of the blade teeth (C and inset).
- 4. Tighten the locking handle (D).

Thrust Bearing Adjustment

 With the thumb screw still loose (from Step 1), slide the thrust bearing and bearing post until the space between the bearing (A) and the back edge of the blade (C) is approximately 1/64".

A convenient way to achieve this spacing is by placing a dollar bill folded twice (four thicknesses) between the blade and support bearing – four thicknesses of a dollar bill is approximately 1/64".

- 6. Tighten the thumb screw (B).
- Loosen the lock knob (G). Rotate the adjustment handles (H) until the guide bearings (F) rest lightly against the blade (C). Do not force the guide bearings against the side of the blade.
- 8. Tighten the lock knob (G).

Check to make sure the adjustments have not changed and the bearing guides do not pinch the blade.

Place the *mode selection lever* (J, Fig. 18) in the *Partial Tension* position when the machine is not in use.

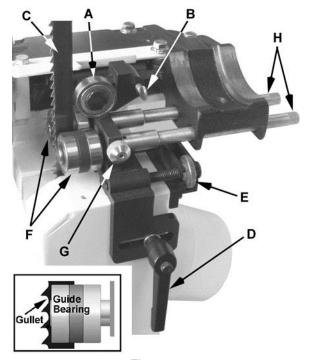


Figure 23

Blade Lead

Blade drift (also known as *lead* or *fence drift*) is a problem that may occur when the blade begins to wander off the cutting line even when the band saw fence is being used. Figure 24 shows an example of blade lead.

Blade lead can be caused by a number of factors, and these should all be checked and corrected if necessary:

- ☐ Fence is not parallel to miter slot and blade.
- Blade is not tensioned correctly.
- Blade is dull.
- □ Teeth have too much "set" on one side of the blade.

If replacement of the blade is not currently an option, the blade lead can be compensated for by skewing the fence. Proceed as follows:

- 1. Cut a scrap piece of wood about the same length as the band saw table, and joint one edge along its length, or rip it on a table saw to give it a straight edge.
- 2. Draw a line on the board parallel with the jointed, or straight edge of the board.
- Move the band saw fence out of the way, and carefully make a freehand cut along your drawn line on the board. Stop about midway on the board, and shut off the band saw (allow the blade to come to a complete stop) but do not allow the board to move.
- 4. Clamp the board to the table.
- 5. Slide the band saw fence over against the board until it contacts the straight edge of the board at some point. Lock the fence down.
- 6. Loosen the four hex cap screws at the top of the fence (see Figure 9) and shift the fence until it is parallel to the board along its length.
- 7. Re-tighten the four hex cap screws.

Note: Skewing the fence to correct blade lead is effective for that particular blade; when a new blade is installed, the fence will probably need readjustment.

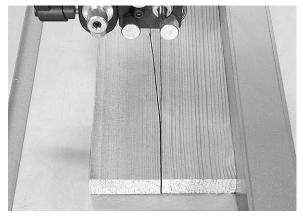


Figure 24

Changing the Blade Speed

AWARNING Disconnect machine power source before making any adjustments.

The JWBS-18QT and -20QT band saw has two blade-speed options which is determined by the position of the pulley drive belt. Refer to the Specifications section (page 6) for speed specs.

To change the blade speed (while referring to Figure 25):

- 1. Loosen the lock handle (A) that secures the motor (C).
- 2. Release belt tension by pulling handle (B) up which raises the motor, then tighten lock handle (A).
- 3. Open the lower wheel door (C, Fig. 27).
- 4. Referring to Figure 26:

For higher blade-speed – place the poly V-belt in the A position on the spindle and motor pulleys as shown in Figure 26.

For lower blade-speed - place the poly V-belt in the B position on the spindle and motor pulleys.

After repositioning the belt:

- 5. Unlock lock handle (A, Fig. 25). Apply belt tension by slightly pushing handle (B, Fig. 25) down.
- 6. Tighten the lock handle (A, Fig, 25) to secure the motor (C, Fig. 25).

Belt Tension

The drive belt and pulleys are properly adjusted at the factory. However, belt tension should be occasionally checked. The belt will need to be retensioned after belt replacement.

AWARNING Disconnect machine power source before making any adjustments.

Referring to Figure 25:

- 1. Loosen the lock handle (A) that secures the 3. Tighten the lock handle (A). motor (C).
- 2. Set the belt tension by lightly pressing down on the handle (B).

The weight of the motor should put enough tension on the belt. You just want to push down lightly to take up any slack.

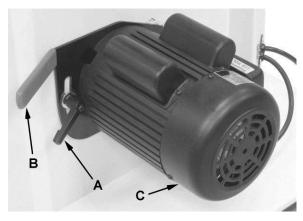


Figure 25

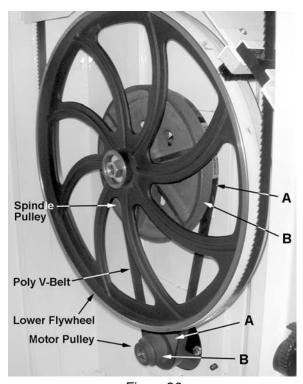


Figure 26

Note: A new belt may stretch slightly during the "breaking in" process, and the tension may occasionally need to be checked and adjusted.

Place the mode selection lever (J, Fig. 18) in the Partial Tension position when the machine is not in use.

Replacing the Poly V-Belt

AWARNING Disconnect machine from power source before making any adjustments.

1. Place the *mode selection lever* (J, Fig. 18) in the *Full Release* position.

Referring to Figure 25:

- 2. Loosen the *lock handle* (A) that secures the *motor* (C).
- 3. Release belt tension by pulling *handle* (B) up which raises the motor, then tighten *lock handle* (A).
- 4. Open the lower wheel *door* (C, Fig. 27) and remove the *hex nut* and *washer* (D, Fig. 27).
- 5. Remove the *wheel* (E, Fig. 28). If the lower wheel does not come off easily you may need to use a pulley puller to remove it.

Note: If you are doing a pulley alignment *only*, skip Step 6.

Remove the *old belt* (F, Fig. 28) and install the new belt.

Note: For *higher blade-speed*, place the belt on the pulleys closest to the motor (A, Fig. 26). For *lower blade-speed*, place the belt on the pulleys away from the motor (B, Fig. 26).

Since the wheel is still off, this is the most convenient time to check the wheel and motor pulley alignment. Jump to the *Pulley Alignment* procedure (following page) at this time. At the conclusion you will be redirected back here.

After the pulley alignment (if performed) is complete:

- 7. Reinstall the lower wheel, hex nut and washer and tighten the hex nut.
- 8. Unlock *lock handle* (A, Fig. 25). Apply belt tension by slightly pushing *handle* (B, Fig. 25) down.
- 9. Tighten the *lock handle* (A, Fig, 25) to secure the *motor* (C).

Important: Before operating the band saw, refer to the sections listed below and perform the required adjustments described in them.

- ☐ Installing/Changing Blades (page 15)
- ☐ Belt Tension (below)
- ☐ Blade Tension (page 20)
- ☐ Blade Tracking (page 16)
- ☐ Upper Bearing Adjustments (page 17)
- ☐ Lower Bearing Adjustments (page 18)

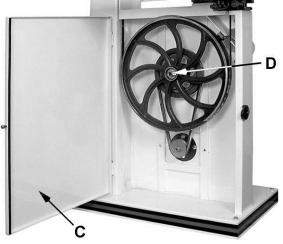


Figure 27

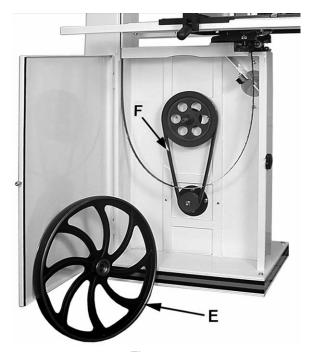


Figure 28

Pulley Alignment

The pulley alignment is done in conjunction with the poly V-belt replacement.

If you are just beginning the alignment, start with the *Replacing the Poly V-Belt* section (previous page.

If you were directed here, proceed as follows:

1. Uses a straight edge placed against the wheel pulley and motor pulley and refer to Figure 29 to determine if alignment is necessary.

If alignment is necessary:

- 2. With a 4mm hex wrench, loosen two set screws on the motor (lower) pulley.
- 3. Adjust the motor pulley by sliding in or out.
- Confirm the alignment of the poly V-belt by placing a straight edge against the faces of both pulleys, (Figure 29). If the straight edge lies flush against both pulleys, then the pulleys and belt are aligned.
- 5. Re-tighten the two set screws on the motor pulley.

Return to Step 7 of the Replacing Poly V-Belt section on page 21.

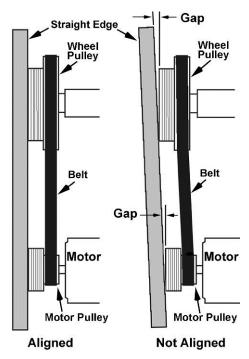


Figure 29

Operating Controls

Start/Stop Switch

The switch shown in Figure 30 is used on model JBWS-18QT band saw.

Press the green *on* button (A, Fig. 4) to start. Press the red safety switch *off* button (B, Fig. 4) to stop.

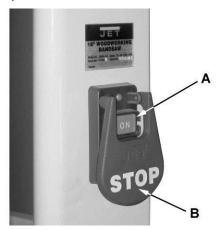


Figure 30 - Start/Stop Switch

The switch shown in Figure 31 is a magnetic switch used on the JBWS-18QT-3 and all JBWS-20QT model band saws.

Power Indicator Light – The start switch has a power indicator lamp which is on whenever there is power connected to the band saw, not just when the band saw is running. Do not assume that no light means there is no power to the machine. If the bulb is bad, there will no indication. Always check before use.

MARNING Do not rely that no light means no power to the machine. Always check for power first. Failure to comply may cause serious injury!

To operate the magnetic Start/Stop switch (referring also to Figure 31):

Start - Press the green start switch.

When power is connected to the machine, the green light is always on regardless of whether the band saw is running or not.

Stop – Press the red switch to stop.

Reset – In the event that the band saw stops without pressing the stop button, as the result of a tripped fuse or circuit breaker, etc.:

- 1. Press red button to reset
- 2. Press the green button to restart the machine.

Safety Key – The magnetic Start/Stop switch comes equipped with a magnetic safety key. When in position on the switch as shown in Figure 31, the magnetic safety key trips a relay which will allow the machine to start and stop when the respective switches are pressed. Being magnetic, the safety key can be removed to make the machine inoperable and can be hidden for safe storage by attaching it underneath the rail or another magnetic surface.

When using a saw equipped with this switch, place the *safety key* on the switch cover, lining up the arrow on the key with the REMOVE arrow on the cover. Then rotate the key so the arrow lines up with the LOCK arrow. This will prevent the safety key from coming loose from vibration when the machine is in use.

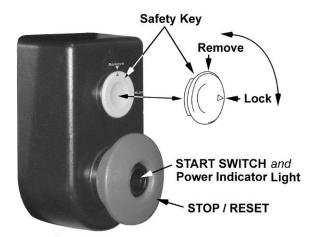


Figure 31 - Magnetic Start/Stop Switch

Brake Pedal (JWBS-20QT only)

Press the brake pedal (A, Fig. 32) while the saw is running to stop the saw. Re-start the saw by pressing the on switch.

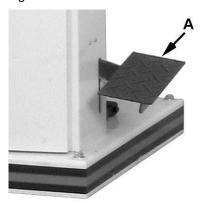


Figure 32 - Brake Pedal

Operation

Note: The following Figures may or may not show your particular band saw model, but the procedures are identical.

General Procedure

- 1. Make sure the blade and upper and lower bearings are properly adjusted for tension and tracking.
- 2. Adjust blade guide assembly so that the guide bearings are just above the workpiece (about 3/16") allowing minimum exposure to the blade. See Figure 33.
- If using the fence, move it into position and lock it to the guide rail. If you are using the miter gauge for a crosscut, the fence should be moved safely out of the way.
- 4. Turn on the band saw and allow a few seconds for the machine to reach full speed.

AWARNING Whenever possible, use a push stick, hold-down, power feeder, jig, or similar device while feeding stock, to prevent your hands getting too close to the blade.

Place the straightest edge of the workpiece against the fence, and push the workpiece slowly into the blade. Do not force the workpiece into the blade.

When cutting, do not overfeed the blade; overfeeding will reduce blade life and may cause the blade to break.

6. When cutting long stock, the operator should use roller stands, support tables, or an assistant to help stabilize the workpiece.

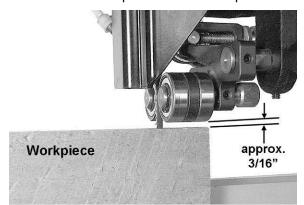


Figure 33

Ripping

Ripping is cutting lengthwise down the workpiece, and with the grain (of wood stock). See Figure 34.

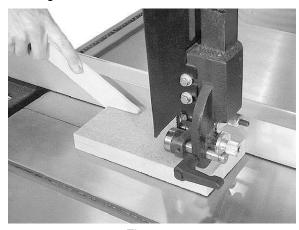


Figure 34

Crosscutting

Crosscutting is cutting across the grain of the workpiece, while using the miter gauge to feed the workpiece into the blade.

Slide the bar of the miter gauge into the end of the slot on the table.

The right hand should hold the workpiece steady against the miter gauge, while the left hand pushes the miter gauge past the blade, as shown in Figure 35.

Do not use the fence in conjunction with the miter gauge. The offcut of the workpiece must not be constrained during or after the cutting process.

ACAUTION Using the fence in conjunction with the miter gauge can cause binding and possible damage to the blade.

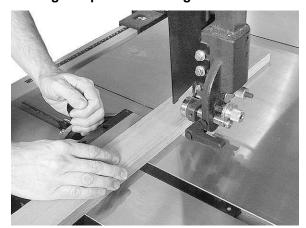


Figure 35

Resawing

Resawing is the process of slicing stock to reduce its thickness, or to produce boards that are thinner than the original workpiece. Figure 36 demonstrates resawing.

The ideal blade for resawing is the widest one the machine can handle, as the wider the blade the better it can hold a straight line.

When resawing thin stock, use a push block, push stick, or similar device to keep your hands away from the blade.

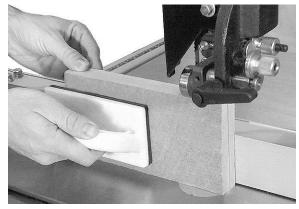


Figure 36

Saw Blade Selection

Using the proper blade for the job will increase the operating efficiency of your band saw, help reduce necessary saw maintenance, and improve your productivity. Thus, it is important to follow certain guidelines when selecting a saw blade.

Here are factors to consider when selecting a blade:

- ☐ The type of material you will be cutting.
- ☐ The thickness of the workpiece or part.
- ☐ The features of the workpiece or part, such as bends or curves with small radii.

These factors are important because they involve basic concepts of saw blade design. There are five (5) blade features that are normally changed to meet certain kinds of sawing requirements. They are:

- 1. width
- 2. pitch (number of teeth per inch),
- 3. tooth form (or shape),
- 4. the "set" of the teeth
- 5. the blade material itself.

Width

Band saw blades come in different standard widths, measured from the back of the blade to

the tip of the tooth. Generally, wider blades are used for ripping or making straight cuts; narrower blades are often used when the part being cut has curves with small radii. When cutting straight lines with a narrow blade, the blade may have a tendency to wander, causing blade lead. (refer to the Blade Lead section in Adjustments).

Pitch

Pitch is measured in "teeth per inch" (TPI). Figure 37 shows blades with different pitches. A fine pitch (more teeth per inch) will cut slower but smoother. A coarse pitch (fewer teeth per inch) will cut rougher but faster. As a rule of thumb, the thicker the workpiece, the coarser will be the blade pitch. If you have to cut a hard or very brittle material, you will probably want to use a blade with a finer pitch in order to get good clean cuts.

General rule: Use a blade that will have no fewer than 6 and no more than 12 teeth in the workpiece at any given time.

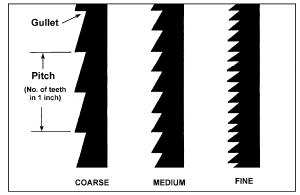


Figure 37

Shape

Figure 38 shows common types of tooth shape. Tooth shape has an effect on cutting rate, and with few exceptions, the Skip and Hook types are used to obtain higher feed rates when cutting thick workpieces. Variable-tooth blades are also available, which combine features of the other styles.

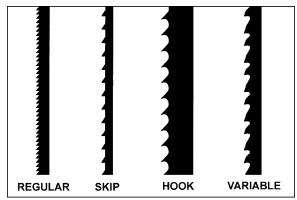


Figure 38

Set

The term "set" refers to the way in which the saw teeth are bent or positioned. Set patterns are usually selected depending on the type of material that needs to be cut. Three common set patterns are shown in Figure 39.

Generally, the *Raker* set is used for cutting metal workpieces; the *Wave* set, when the thickness of the workpiece changes, such as cutting hollow tubing or structurals. The *Straight* set is most often preferred when cutting wood or plastics.

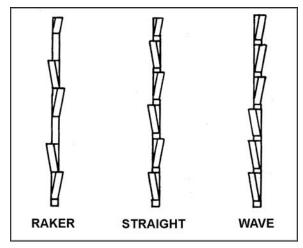


Figure 39

Material

Band saw blades can be made from different types of materials. Some of the most common include spring steel, carbon steel, carbon steel equipped with a high speed or welded edge (bimetal), or carbide tips. A special type of saw blade is made from "high speed steel"; these should not be used on band saws with low rates of speed.

Because of the importance of blade selection, it is recommended that you use the *Blade Selection Guide* on page 27.

AWARNING When cutting, do not overfeed the blade; overfeeding will reduce blade life, and may cause the blade to break.

Blade Breakage

Band saw blades are subject to high stresses and breakage may sometimes be unavoidable. However, many factors can be controlled to help prevent most blade breakage. Here are some common causes for breakage:

- 1. Misalignment of the blade guides
- 2. Feeding work too fast
- Using a wide blade to cut a short radius curve
- 4. Excessive tension
- 5. Teeth are dull or improperly set
- 6. Upper guides are set too high off the workpiece
- 7. Faulty weld on blade

Maintenance

AWARNING Before any intervention on the machine, disconnect it from the electrical supply by pulling out the plug. Failure to comply may cause serious injury.

Keep bearing guides clean and free of build-up.

Check that the cleaning brush over the band wheel is working properly, and remove any deposits from the band wheels to avoid vibration and blade breakage.

The table surface should be kept clean and free of rust for best results. Some users prefer a paste wax coating. Another option is talcum powder applied with a blackboard eraser rubbed in vigorously once a week; this will fill casting pores and form a moisture barrier. This method provides a table top that is slick and allows rust rings to be easily wiped from the surface. Important also is the fact that talcum powder will not stain wood or mar finishes as wax pickup does.

Do not let saw dust build up in the upper and lower wheel housings. Vacuum out frequently.

Connect the band saw to a JET dust collection system.

Clean and grease the raising/lowering rack for the upper bearing guides if it becomes difficult to raise or lower.

Clean and oil the tensioning mechanism if it becomes difficult to adjust.

Vacuum out the motor fan cover.

Blade Selection Guide

Identify the material and thickness of your workpiece. The chart will show the recommended PITCH, blade TYPE, and FEED RATE.

Key: H - Hook L - Low

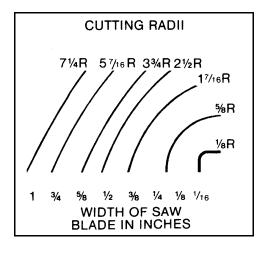
 $\begin{array}{ll} S-Skip & M-Medium \\ R-Regular & H-High \end{array}$

Example: 10/H/M means 10 teeth per inch / Hook Type Blade / Medium Feed

Material/s		Workpiece Thickness			
IVIC	aleriai/S	1/2"	1"	3"	6+"
Woods	Hardwood	10/R/L	8/R/L	3/H/M	3/H/M
Woods	Softwood	10/R/L	8/R/L	3/H/M	3/H/M
	Carbon	10/R/L	6/R/L	3/S/M	3/S/M
Non-	Mica	32/R/L			
Metals	Asbestos	8/R/L	6/R/L	3/S/M	3/S/M
	Hard Rubber	10/R/L	8/R/L	6/R/M	2/S/H
	Formica	14/R/M	10/R/M	4/H/H	4/H/H
	Masonite	10/R/L	4/S/L	3/S/M	3/H/M
Plastics	Micarta	14/R/M	10/R/M	4/H/H	3/H/H
	Plexiglas	10/R/L	6/R/L	3/S/M	3/S/M
	Paper	14/R/L	10/R/L	4/S/L	3/S/M

Study the part drawing or prototype, or actually measure the smallest cutting radius required, and locate this radius (in inches) on the chart at the right. Follow the curve to where the approximate blade width is specified. If a radius falls between two of the curves, select the widest blade that will saw this radius.

This procedure should be used for making initial blade selections. These recommendations can, of course, be adjusted to meet specific requirements of a cutting job. Compromises may be necessary if you cannot find all needed specifications in a single blade.



Troubleshooting

Trouble	Probable Cause	Remedy
	Saw unplugged	Check plug connections
Saw stops or will not start	Fuse blown, or circuit breaker tripped	Replace fuse, or reset circuit breaker
	Cord damaged	Replace cord
Does not make	Stop not adjusted correctly	Check blade with square and adjust stop
accurate 45° or 90° cuts	Angle pointer not set accurately	Check blade with square and adjust pointer
	Miter gauge out of adjustment	Adjust miter gauge
	Fence not aligned with blade	Check and adjust fence
	Warped wood	Select another piece of wood
Blade wanders during	Excessive feed rate	Reduce feed rate
cut	Incorrect blade for cut	Change blade to correct type
	Blade tension not set properly	Set blade tension according to blade size
	Guide bearings not set properly	Review guide bearing adjustment.
	Dull blade	Replace blade
	Blade mounted wrong	Teeth should point down
Saw makes unsatisfactory cuts	Gum or pitch on blade	Remove blade and clean
,	Incorrect blade for cut	Change blade to correct type
	Gum or pitch on table	Clean table
Blade does not come	Extension cord too light or too long	Replace with adequate size and length cord
up to speed	Low shop voltage	Contact your local electric company
	Base on uneven floor	Reposition on flat, level surface
Saw vibrates	Bad v-belt	Replace v-belt
excessively	Motor mount is loose	Tighten motor mount hardware
	Loose hardware	Tighten hardware

Parts

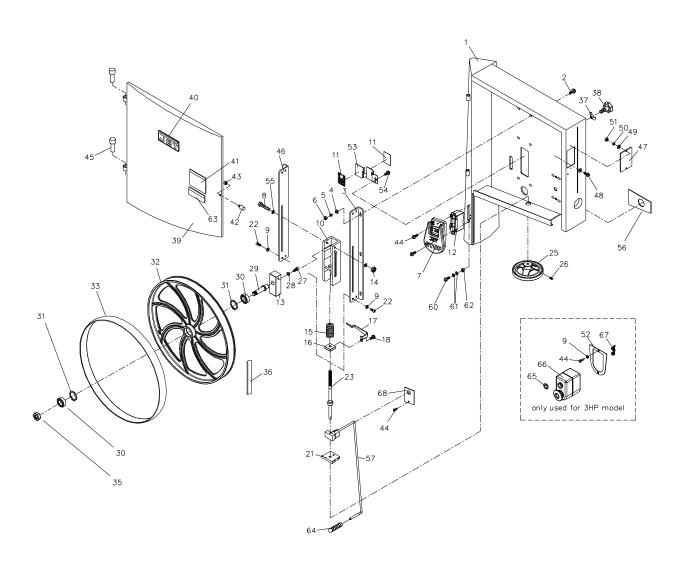
Replacement Parts

Replacement parts are listed on the following pages. To order parts or reach our service department, call 1-800-274-6848, Monday through Friday (see our website for business hours, www.jettools.com). Having the Model Number and Serial Number of your machine available when you call will allow us to serve you quickly and accurately.

Upper Wheel Assembly (18QT)

Index No.	Part No.	Description	Size	Qty
1	. JWBS18DXA-101A .	.Saw Body		1
		.Carriage Bolt		
3	.JWBS18DXA-103	.Upper Wheel Bracket, Right Side.		1
4	. TS-0680031	.Flat Washer	5/16	6
5	. TS-0720081	.Lock Washer	5/16	6
6	. TS-0561021	.Hex Nut	5/16-18	6
7	. JPS10TS-342	.Stop Switch Face Plate	for 1.75 HP	1
8	. TS-1490151	.Hex Cap Screw	M8x80	1
		.Flat Washer		
10	.JWBS18DX-110	.Sliding Bracket		1
		.Blade Tension Indicator Label		
		.Main Switch		
		.Shaft Bracket		
		.Nylon Insert Lock Nut		
		.Spring		
		.Square Nut		
		.Pointer		
		.Screw		
		.Bracket		
		.Hex Cap Screw		
		Blade Adjusting Screw		
		.Hand Wheel		
		.Set Screw		
		Socket Head Cap Screw		
		Lock Washer		
		.Upper Wheel Shaft		
		Ball Bearing		
		Retaining Ring		
		.Upper Wheel		
		.Tire		
		.Hex Nut		
		.Blade		
		.Wing Nut		
		.Lock Knob		
		.Upper Front Door		
		.Seal Strip, 29.92"L (not shown)		
		.JET Nameplate		
		.Warning Label		
		.Bolt		
		.Hex Nut		
		.Screw		
		.Hex Cap Screw		
		.Door Hinge Pin		
		.Upper Wheel Bracket, Left Side		
		.Tracking Window		
		.Screw		
49	. TS-1550031	.Flat Washer	M5	4
50	. TS-2361051	.Lock Washer	M5	2
		.Hex Nut		
52	. JWBS18DXA-152A .	.Switch Plate	for 1.75HP	1
		.Switch Plate		
		.Scale Bracket		
		.Screw		
		.Flat Washer		
56	.JWBS18DXA-156	.Tension Status Label		1
57	.JWBS18DXA-157	.Blade Tension Arm Assembly		1
		•		

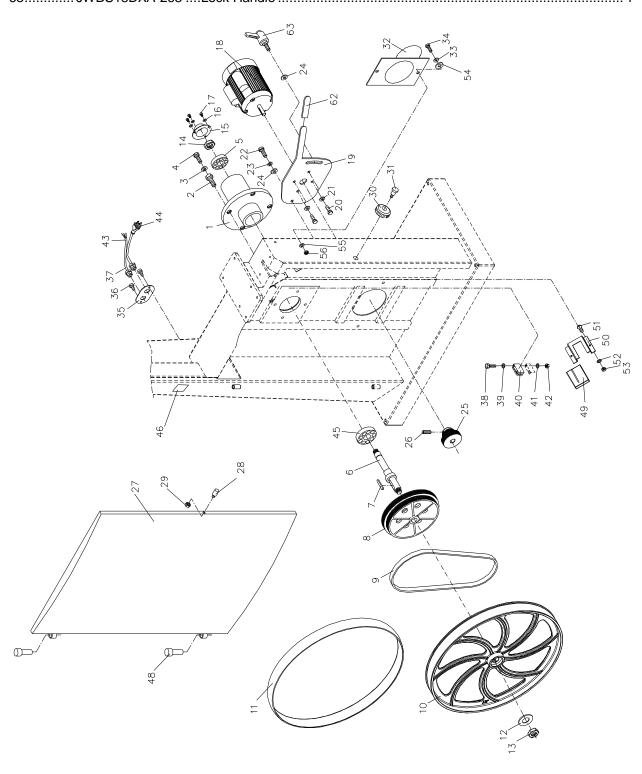
Index No. Part No.	Description	Size	Qty
60TS-1533052	Screw	M5 x 16	1
61JWL1220VS-14	6Star Washer	M5	1
62TS-1540031	Hex Nut	M5	1
	63Blade Warning Label		
64JWBS18DXA-16	64Grip		1
65PM2000-298	Safety Key for Magnetic Switch	for 3HP	1
	Magnetic Switch		
	Strain Relief		
68JWBS18DXA-16	68Spring Plate		1



Lower Wheel and Motor Assembly (18QT)

Index No.		Description	Size	Qty
1		Bearing Base		
2	JWBS20-62	Adjusting Bolt		4
3	TS-0720091	Lock Washer	3/8	4
		Hex Cap Screw		
		Ball Bearing		
		Spindle		
		Key		
		Spindle Pulley		
ο		Poly V-Belt	440 I	1
		Lower Wheel		
		Tire		
		Flat Washer		
		Hex Nut		
		Hex Nut		
		Bearing Cover		
16	TS-0720051	Lock Washer	#10	3
17	TS-081C022	Screw	#10-24 x 3/8	3
18	JWBS18DX-218	Motor1.75HP, 1Ph,	115/230V (prewired 115V).	1
	JWBS18DX-218A .	Motor	3HP, 1Ph, 230V	1
	JWBS18X-MFC	Motor Fan Cover (not shown)		1
19	.IWBS18DXA-219	Motor Bracket		1
		Hex Cap Screw		
		Flat Washer		
		Hex Cap Screw		
		Lock Washer		
		Flat Washer		
		Motor Pulley		
		Motor Pulley		
		Set Screw		
27	JWBS18DXA-227 .	Lower Front Door		1
	JWBS18-139A	Seal Strip, 29.92"L (not shown)	29.92"	1
28	JWBS18-142	Bolt		1
29	TS-0561011	Hex Nut	1/4-20	1
30	JWBS20-2	Lock Knob		1
		Screw		
-		Dust Chute		
		Flat Washer		
		Hex Cap Screw		
		Plate		
		Screw		
		Strain Relief Bushing		
		Screw		
		Flat Washer		
		Brush		
		Lock Washer		
42	TS-0560071	Hex Nut	#10-24	2
		Motor Cord		
		Motor Cord		
		Power Cord		
		Power Cord		
		Ball Bearing		
		I.D. Label		
		I.D. Label		
		Door Hinge Pin		
		Bracket		
		Shelf		
51	TS-081C032	Screw	#10-24 x 1/2	2

Index No. Part No.	Description	Size	Qty
52TS-1550	031Flat Washer	M5	2
53TS-0560	071Hex Nut	#10-24	2
54JWBS18	DX-254Plastic Washer	5/16	1
55TS-0720	081Lock Washer	5/16	2
56TS-0561	021Hex Nut	5/16-18	2
62JWBS18	DXA-262Grip		1
63JWBS18	DXA-263Lock Handle		1



Blade Guide Assembly (18QT)

Index No.	Part No.	Description	Size	Qty
1	. TS-0051051	Hex Cap Screw	5/16-18 x 1	4
2	. TS-0720081	Lock Washer	5/16	4
		Flat Washer		
4	.JWBS18DX-304	Guide Bar Bracket		1
5	. JWBS18-305	Worm		1
		E-Ring		
		Gear Base		
		Bushing		
9	JWBS18-309	C-Ring	S-12	2
		Shaft		
		.Gear		
		Socket Head Cap Screw		
		Lock Knob		
		Plate		
		Button Head Socket Screw		
		Guide Bar		
		Pointer		
		Lock Washer		
		Hex Cap Screw		
20	.JWBS18-320N	Guide Bracket	4/4.00 4/0	1
		Socket Head Cap Screw		
		Blade Guard		
		Lock Washer		
		Hex Nut		
		Locking Shaft		
		C-Ring		
		Ball Bearing		
		Spacer		
29	. JWBS20-329	Shaft		2
30	. TS-0270031	Set Screw	5/16-18 x 3/8	2
31	. JWBS20-2	Lock Knob		1
32	. TS-081F052	Screw	1/4-20 x 3/4	1
33	. JWBS18-333	Hand Wheel		1
34	. TS-0267041	Set Screw	1/4-20 x 3/8	1
35	.JWBS20-103A	Handle		1
		Cutting Height Scale		
		.Bracket		
-		.Base		
		Threaded Lock Bushing		
		Bolt		
		Lock Knob		
		.Screw		
		Socket Head Cap Screw		
		Flat Washer		
-		Bracket		
		Wing Screw		
		Set Screw		
		Knob		
		Socket Head Cap Screw		
		Socket Head Cap Screw		
		Bracket		
		Wing Screw		
		Bearing Support		
		Lock Bushing		
		Socket Head Cap Screw		
		Bearing Bracket		
58	. 6295293	Locking Handle		1

Index No. Part No.	Description	Size	Qty
59JWBS18DX-359	Locking Handle		1
60JWBS18DX-360	Shaft		1
61JWBS18DX-361	Adjusting Screw		1
62JWBS18DX-362	Adjusting Bracket		1
63JWBS18DX-363	Nut		1
64TS-0267021	Set Screw	1/4-20 x 1/4	1
65JWBS18DX-365	Set Screw, Special		1
66JWBS18DX-366	Adjustment Handle		2
67TS-0680031	Flat Washer	5/16	1
69TS-0561011	Hex Nut	1/4-20	1
70TS-081F032	Pan Head Screw	1/4-20 x 1/2	2

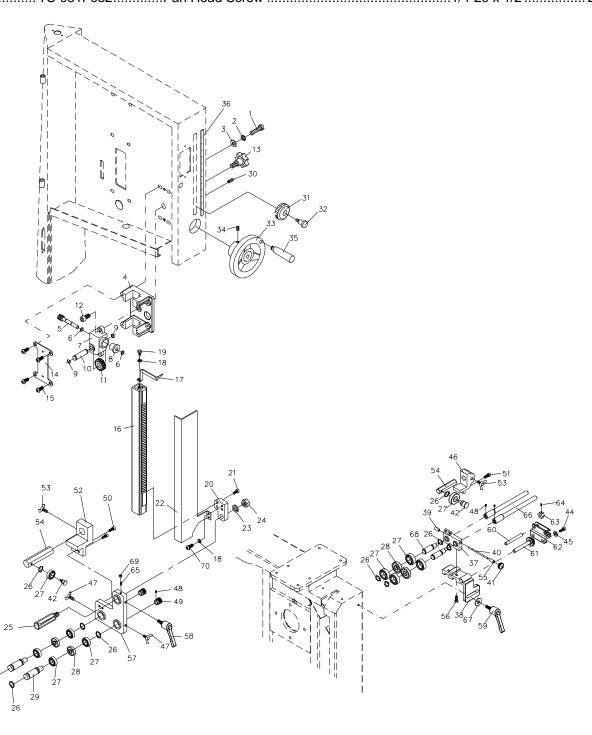


Table and Fence Assembly (18QT)

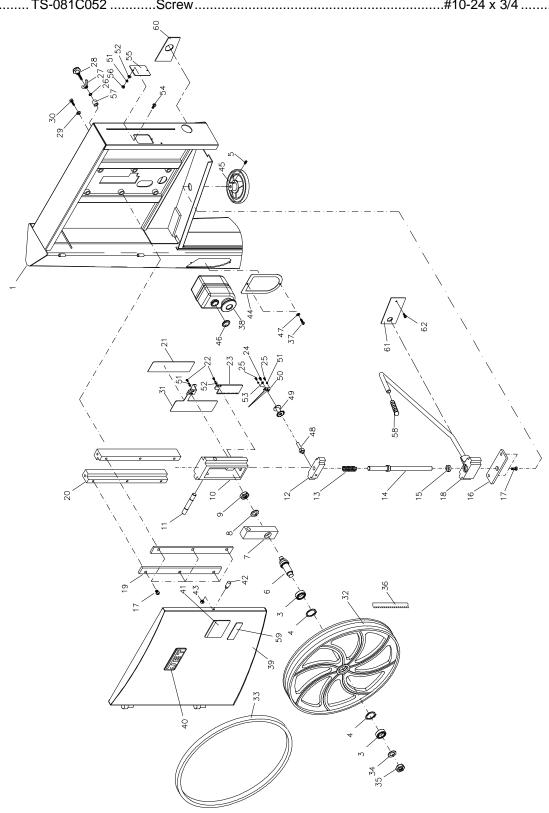
Index No.		Description	Size	Qty
1	.JWBS18-401	Lock Handle		1
		Flat Washer		
		Miter Gauge Body		
4	. JWBS20-156	Guide Disc		1
		.Screw		
-		Pointer		
		Guide Bar		
		Trunnion Support Bracket		
		Hex Cap Screw		
10	. TS-0720081	Lock Washer	5/16	8
11	. TS-0270061	Set Screw	5/16-18 x 5/8	2
12	. TS-0060111	Hex Cap Screw	3/8-16 x 2-1/2	1
13	. TS-0561031	Hex Nut	3/8-16	1
14	. TS-0720091	Lock Washer	3/8	1
		Lock Knob		
		Trunnion		
		Trunnion Clamp Shoe		
		Hex Cap Screw		
		Socket Head Cap Screw		
		Scale		
		.Table		
		Front Rail		
		Hex Cap Screw		
		Lock Washer		
		Scale		
		.Guide Rail		
		Rear Rail		
		Table Insert		
		Roll Pin		
		Fence Body		
		Knob		
		Lock Handle		
		Lock Plate		
		Pad		
		Pin		
		Pin		
		.Fence		
		Socket Head Cap Screw		
		Flat Washer		
		Screw		
		External Tooth Lock Washer		
		Pointer		
		Hex Nut		
		Sliding Pad		
		Rear Hook		
		Pointer		
47	. JWBS18-447	Screw	M5 x 8	1
		Table Pin		
		Resaw Post		
50	.JWBS18-450	Lock Knob		1
		JET Fence Label		
		Hex Cap Screw		
		Lock Washer		
		.Flat Washer		
		.Lower Blade Guard		
		Hex Cap Screw		
		.Wrench		
				-

Index No. Part No.	Description	Size	Qty
59JWBS18DX-459	C-Ring	S-10	1
60JWBS18DX-460	Link Chain		1
61TS-0680031	Flat Washer	5/16	2
JWBS18-MGCP	Miter Gauge Assembly		1
JWBS18QT-FCP	Fence Assembly		1
	43		
	24		
	2		
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Upper Wheel Assembly (20QT)

Index No.	Part No.	Description	Size	Qty
		Saw Body		
	.JWBS20QT-501A	Saw Body	for 5HP	1
3	. BB-6205ZZ	Ball Bearing	6205	2
		Retaining Ring		
		Set Screw		
		Upper Wheel Shaft		
		Upper Wheel Shaft Bracket		
		Flat Washer		
		Hex Nut		
		Upper Wheel Bracket Base		
		Bracket Shaft		
		Elevator Bracket		
		Spring		
		Adjustment Screw		
		Thrust Bearing		
16	. JWBS20QT-516	.Plate		1
		Button Head Socket Screw		
		Blade Tension Arm Assembly		
		.Plate		
20	.JWBS20QT-520	Support Bracket		2
		Blade Width/Tension Scale		
22	. TS-0206021	Socket Head Cap Screw	#10-24x1/2	4
		Rack		
		Button Head Socket Screw		
		Pan Head Machine Screw		
		Lock Washer		
		.Wing Nut		
		Lock Knob		
		.Flat Washer		
		Hex Cap Screw		
		Blade Width Gauge Plate		
		Upper Wheel		
		.Tire		
		Flat Washer		
		Hex Nut		
		Blade150"L x		
		Hex Cap Screw		
38	. PM2000-293	Magnetic Switch	3HP, 1Ph	1
		Magnetic Switch		
39	.JWBS20QT-539	Upper Front Door		1
	.JWBS18-139A	Seal Strip, 29.92"L (not shown)	cut to fit 21.26"	1
40	. JWBS18-140	JET Plaque		1
		Warning Label		
		.Door Stud		
		.Hex Nut		
		Switch Plate		
		Hand Wheel		
-		Safety Key for Magnetic Switch		
40 17	. 1 1412000-230 TS-0680021	Salety Rey for Magnetic Switch	1//	າ
		Scale Shaft		
		Gear Wheel		
		Pointer		
		Lock Washer		
		Flat Washer		
		Lock Washer		
		Pan Head Machine Screw		
55	.JWBS18DX-147	Tracking Window		1

Index No. Part No.	Description	Size	Qty
56TS-0560071	Hex Nut	#10-24	2
572013-333	Spacer		1
58JWBS18DXA-164.	Grip		1
59JWBS18DXA-163.	Blade Warning Label .		1
61JWBS18DXA-168.	Spring Plate		1
62 TS-081C052		#10-24 v 3/4	

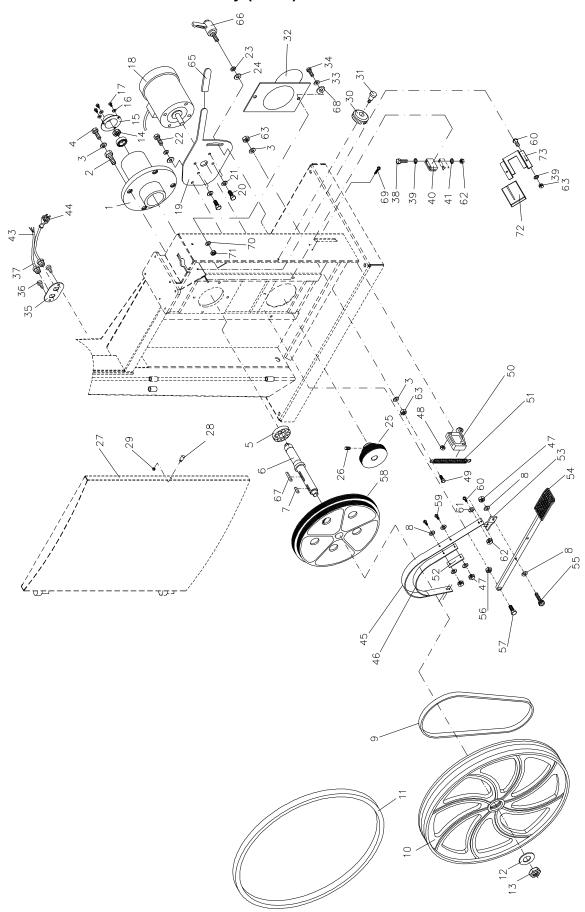


Lower Wheel and Motor Assembly (20QT)

Index No. Part No.	Description	Size	Qty
	Bearing Base		
	Adjusting Bolt		
	Lock Washer		
	Hex Cap Screw		
	Ball Bearing		
	Spindle		
	Key		
	Flat Washer		
	V-Belt		
	Lower Wheel		
	Tire		
12TS-0680091	Flat Washer	3/4	1
13JWBS20-22	Hex Nut	3/4-16UNF L.H	1
14JWBS20-214	Hex Nut	3/4-16UNF R.H	1
15JWBS20-215	Bearing Cover		1
16TS-0720071	Lock Washer	1/4	3
17JWBS20-217	Screw	1/4x3/8	3
18JWBS18DX-218A	Motor	3HP, 1Ph, 230V Or	ly 1
JWBS18DX-218ASC	Starting Capacitor (not shown)	300MFD, 125VAC .	1
	Running Capacitor (not shown)		
	Capacitor Cover (not shown)		
	Junction Box (not shown)		
	Junction Box Cover (not shown)		
	Motor Fan (not shown)		
	Motor Fan Cover (not shown)		
	Centrifugal Switch (not shown)		
	Motor		
	Motor Fan (not shown)		
	Motor Fan Cover (not shown)		
	Starting Capacitor (not shown)		
	Running Capacitor (not shown)		
	Capacitor Cover (not shown)		
	Junction Box (not shown)		
	Junction Box Cover (not shown)		
	Centrifugal Switch (not shown)		
	Motor Bracket		
	Hex Cap Screw		
	Flat Washer		
	Hex Cap Screw		
	Lock Washer		
	Flat Washer		
	Motor Pulley		
26 TS_0270031	Set Screw	5/16-18×3/8	ı
	Lower Front Door		
1\(\text{IVDS2UQ1-221}	Seal Strip, 29.92"L (not shown)	out to fit 29 74"	I
JVVD310-139A	Door Stud	Cut to 11t 26.74	ا 1
	Hex Nut		
	Lock Knob		
	Pan Head Machine Screw		
	Dust Chute		
	Flat Washer		
	Hex Cap Screw		
	Cord Plate		
	Cord Plate		
	Pan Head Machine Screw		
	Strain Relief Bushing		
JWBS20X-237A	Strain Relief Bushing	tor 5HP	2

Index No. Part No.	Description	Size	Qty
38TS-081C082	Pan Head Machine Screw	#10-24x1-1/2	2
39TS-069204	Flat Washer	#10	4
	Brush		
41TS-0720051	Lock Washer	#10	2
43JWBS18DX-243A	Motor Cord	for 3HP	1
	Motor Cord		
	Power Cord		
	Power Cord		
	Brake Band		
	Brake Belt		
	Hex Nut		
	Hex Nut		
	Hex Cap Screw		
	Brake Switch		
	Spring		
	Plate		
53JWBS20-82	Brake Locking Bracket		2
54JWBS20-254	Brake Pedal		1
	Socket Head Cap Screw		
	Hex Nut		
	Hex Cap Screw		
	Spindle Pulley		
	Hex Cap Screw		
	Pan Head Machine Screw		
	Flat Washer		
	Hex Nut		
	Hex Nut		
	Brake Switch Cord (not shown)		
	Grip		
	Lock Handle		
	Key		
	Plastic Washer		
	Pan Head Machine Screw		
	Lock Washer		
	Hex NutBracket		
	Shelf		
73JVVB318DX-250			1

Lower Wheel and Motor Assembly (20QT)



Blade Guide Assembly (20QT)

Index No.	Part No.	Description	Size	Qty
1	.TS-0051051	Hex Cap Screw	5/16-18x1	4
		Lock Washer		
		Flat Washer		
		Guide Bar Bracket		
		Worm		
		E-Ring		
		Gear Base		
		Bushing		
		C-Ring		
10	. JWBS18-310	Shaft		1
		Gear		
		Socket Head Cap Screw		
		.Lock Knob		
		Plate		
		Hex Cap Screw		
		Guide Bar		
		Pointer		
		Hex Cap Screw		
		.Blade Guard		
		Flat Washer		
		Lock Washer		
		Hex Cap Screw		
		Wing Bolt		
		.Bracket Shaft		
		C-Ring		
		Ball Bearing		
		Spacer		
		Upper Guide Shaft		
		Set Screw		
		Lock Knob		
		Pan Head Machine Screw		
		Hand Wheel		
		.Set Screw		
		Handle		
		Cutting Height Scale		
		.Bracket		
		.Base		
		Threaded Lock Bushing		
		.Bolt		
		Lock Knob		
		.Screw		
		Guide Bar Bracket		
		Set Screw		
		Lock Washer		
		Hex Nut		
		Set Screw		
		Thumb Screw		
		Socket Head Cap Screw		
		Socket Head Cap Screw		
		.Bracket		
		Thumb Screw		
		Bearing Support		
		Lock Bushing		
		Lock Washer		
		Socket Head Cap Screw		
		Bearing Bracket		
59	.JWBS18DX-360	Shaft		1

Index No. Part No.	Description	Size	Qty
60JWBS20-360	Bracket		1
61JWBS18DX-361	Adjusting Screw		1
	Adjusting Bracket		
63JWBS18DX-363	Nut		1
64TS-0267021	Set Screw	1/4-20x1/4	1
65JWBS18DX-365	Set Screw, Special		1
66JWBS18DX-366	Adjustment Handle		2
	Flat Washer		
68JWBS20-329A	Lower Guide Shaft		2
69TS-0561011	Hex Nut	1/4-20	1
706295293	Locking Handle		1
71JWBS18DX-359	Locking Handle		1
72TS-0207041	Socket Head Cap Screw	1/4-20x3/4	2

Blade Guide Assembly

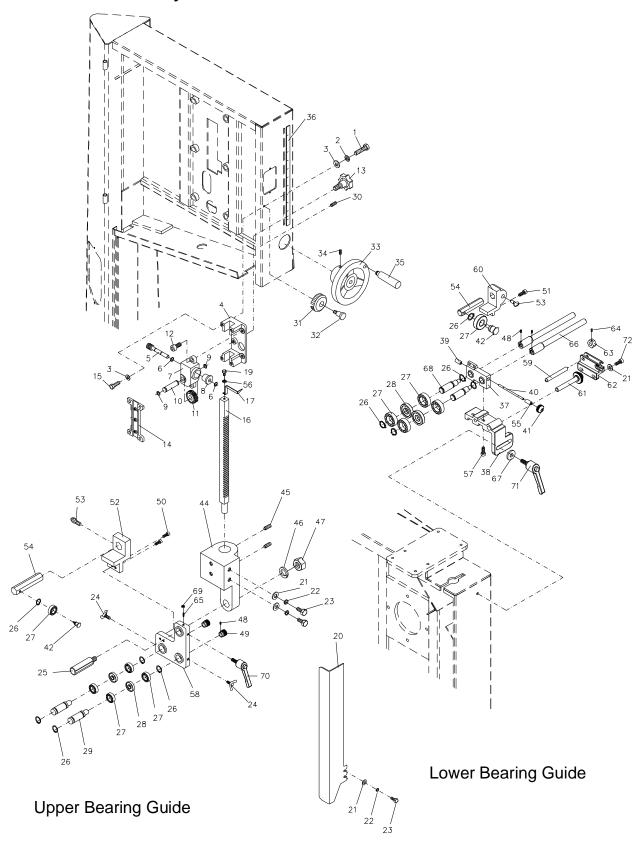
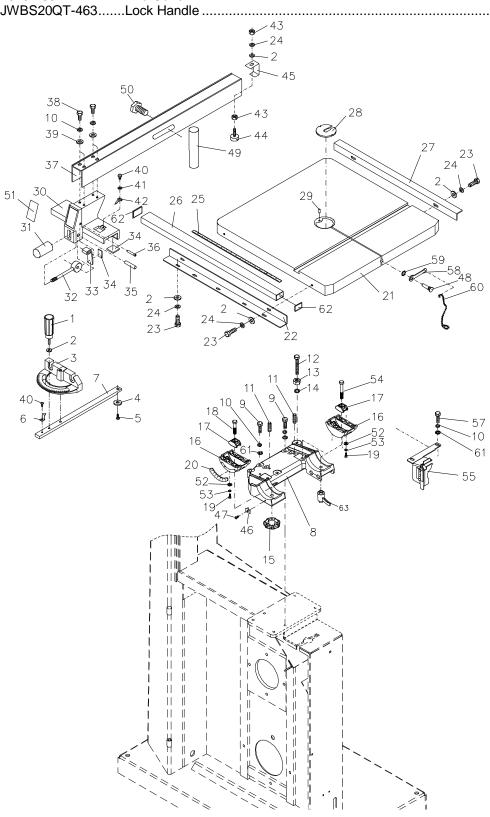


Table and Fence Assembly (20QT)

Index No.		Description	Size	Qty
1	. JWBS18-401	.Locking Handle		1
		.Flat Washer		
		.Miter Gauge Body		
		.Guide Disc		
		.Screw		
-		.Pointer		
		.Guide Bar		
8	.JWBS18DX-408	.Trunnion Support Bracket		1
9	. TS-0051071	.Hex Cap Screw	5/16-18x1-1/2	4
10	. TS-0720081	.Lock Washer	5/16	8
11	. TS-0270061	.Set Screw	5/16-18x5/8	2
12	.TS-0060111	.Hex Cap Screw	3/8-16x2-1/2	1
13	. TS-0561031	.Hex Nut	3/8-16	1
14	. TS-0720091	.Lock Washer	3/8	1
		.Lock Knob		
		.Trunnion		
		.Trunnion Clamp Shoe		
		.Hex Cap Screw		
		Socket Head Cap Screw		
		Scale		
		.Table		
		Front Rail		
		.Hex Cap Screw		
		Lock Washer		
		Scale		
		.Guide Rail		
		.Rear Rail		
		.Table Insert		
		.Roll Pin		
		.Fence Body		
		.Handle		
		.Cam		
		.Lock Plate		
-		Pad		_
		.Pin		
		.Pin		
		.Fence		
		.Socket Head Cap Screw		
		.Flat Washer		
		.Screw		
		.External Tooth Lock Washer		
		.Pointer		
43	. TS-0561011	.Hex Nut	1/4-20	2
44	.JWBS18-444	.Sliding Pad		1
45	. JWBS18-445	.Rear Hook		1
46	. JWBS18-446	.Pointer		1
47	. JWBS18-447	.Screw	M5x8	1
		.Table Pin		
		.Resaw Guide		
		.Lock Knob		
		.Miter Gauge Assembly		
		Fence Assembly		
		JET Fence Label		
		.Flat Washer		
		Lock Washer		
		.Hex Cap Screw		
		Lower Blade Guard		
J J				

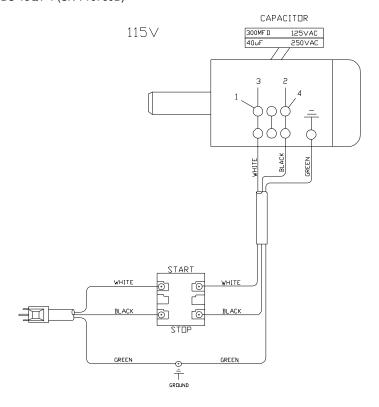
Index No.	Part No.	Description	Size	Qty
57	. TS-0051091	Hex Cap Screw	5/16-18x2	2
58	. 40-0260	Wrench		1
59	.JWBS18DX-459	C-Ring	S-10	1
		Link Chain		
61	. TS-0680031	Flat Washer	5/16	6
62	. 2013-285	End Cover		2
63	.JWBS20QT-463	Lock Handle		1



Electrical Connections

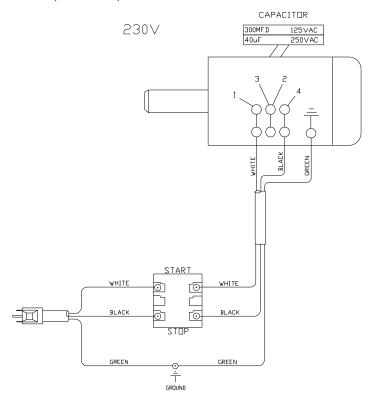
1 3/4 HP, 1Ph, 115V

Band Saw Model No.: JWBS-18QT-1 (SN 710750B)

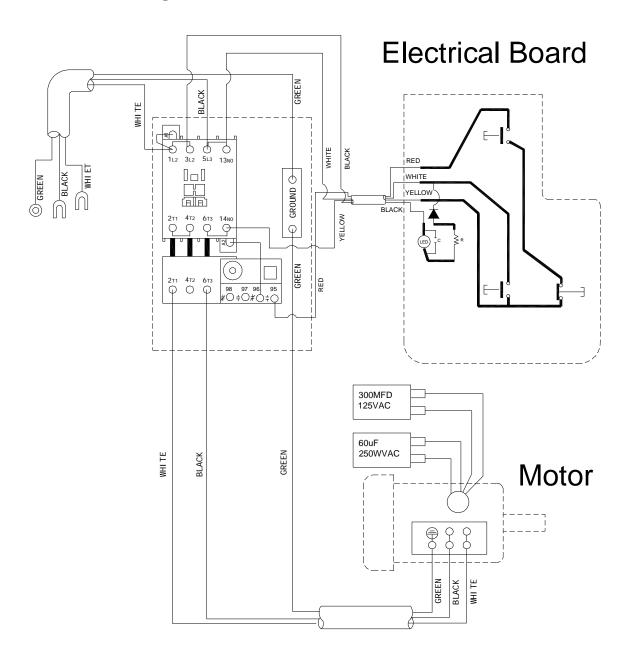


1-3/4 HP, 1Ph, 230V

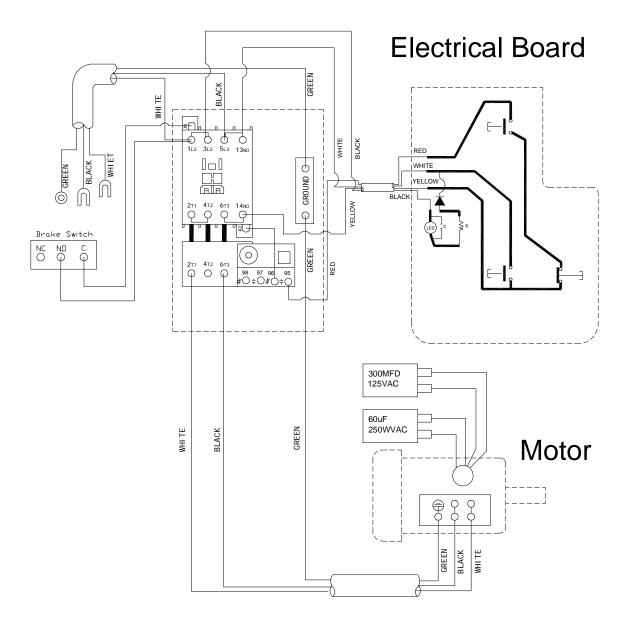
Band Saw Model No.: JWBS-18QT-1 (SN 710750B)



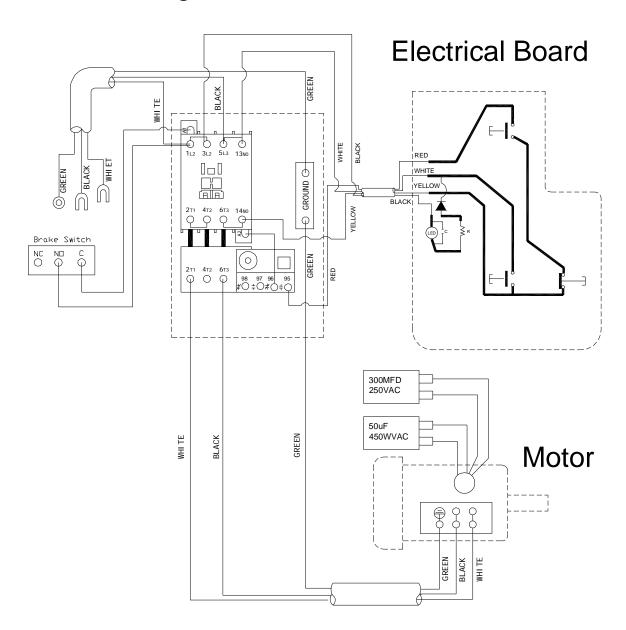
Magnetic Switch



Magnetic Switch



Magnetic Switch



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